

to 4 a. m. Eggs were deposited in all three periods, the smallest number being laid in the 8 p. m. to 4 a. m. period.

When the weevils were placed in a refrigerator at a temperature of 42° F. no eggs were deposited.

INCUBATION PERIOD

During the month of June the incubation period was between 2.5 and three days. In cooler weather this period would be longer. Workers in California (1) found that from three to five days were required for incubation with an average of 4.3 days. Freshly laid eggs kept at a temperature of about 42° F. had not hatched after the end of 26 days.

LARVAL PERIOD

Just after hatching the larva measures around a millimeter in length. It usually bores its way into the seed mass in the center of the pod. At an early period it may often be found in a cavity which it has hollowed out in a single seed. Occasionally one may be found in the carpellary partition. The larval period was from six to nine days with the larvae having three instars. In the last stage a definite cell is formed by the larva in which it pupates. This cell, made from frass, is dark in color and brittle.

During the time it is active the larva repairs this cell if it is broken open.

PUPAL PERIOD

The length of the pupal stage during the time of study was four days.

ADULT PERIOD

After the adult form has been reached it may take some time for emergence from the pepper. One weevil was observed at 8 o'clock in the morning trying to cut through a pod which was getting dry and tough and it had not yet cut its way through by 5 o'clock in the afternoon. The following morning it had emerged, but at least something more than nine hours had been spent in doing this.

Five of a group of six weevils which emerged about May 20 were alive August 20 when this work was discontinued. During this period the weevils were fed on pepper pods. In California the average length of life was about 79 days and one individual lived 316 days.

The following table shows the length of life without food and without food and water during the month of July, newly emerged adults being used: